

Sequence Listing:

Applicant: Quality Wheat CRC Limited

Title of the Invention: Detection of preharvest sprouting in cereal grains

Number of SEQ ID NOs: 5

Software: PatentIn Ver. 2.1

SEQ ID NO: 1

Length: 15

Type: PRT

Organism: Triticum aestivum

Sequence: 1

Ile	Asp	Arg	Leu	Val	Ser	Ile	Arg	Thr	Arg	Gly	Gln	Ile	His	Ser
1				5					10				15	

SEQ ID NO: 2

Length: 10

Type: PRT

Organism: Triticum aestivum

Sequence: 2

Cys	Arg	Asp	Asp	Arg	Pro	Tyr	Ala	Asp	Gly
1				5					10

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SEQ ID NO: 3

Length: 10

Type: PRT

Organism: Triticum aestivum

Sequence: 3

Val Asn Trp Val Asn Lys Val Gly Gly Ser

1 5 10

SEQ ID NO: 4

Length: 425

Type: PRT

Organism: Triticum aestivum

Sequence: 4

Met Ala Ser Lys His Leu Ser Leu Phe Leu Val Leu Leu Gly Leu Ser

1 5 10 15

Ala Ser Leu Ala Ser Gly Gln Val Leu Phe Gln Gly Phe Asn Trp Glu

20 25 30

Ser Trp Lys His Asn Gly Gly Trp Tyr Asn Phe Leu Met Gly Lys Val

35 40 45

Asp Asp Ile Ala Ala Ala Gly Val Thr His Val Trp Leu Pro Pro Ala

50 55 60

Ser Gln Ser Val Ser Glu Gln Gly Tyr Met Pro Gly Arg Leu Tyr Asp

65 70 75 80

Leu Asp Ala Ser Lys Tyr Gly Asn Lys Ala Gln Leu Lys Ser Leu Ile

85 90 95

Gly Ala Leu His Gly Lys Gly Val Lys Ala Ile Ala Asp Ile Val Ile

100 105 110

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Asn His Arg Thr Ala Glu Arg Lys Asp Gly Arg Gly Ile Tyr Cys Ile
 115 120 125

Phe Glu Gly Gly Thr Pro Asp Ala Arg Leu Asp Trp Gly Pro His Met
 130 135 140

Ile Cys Arg Asp Asp Arg Pro Tyr Ala Asp Gly Thr Gly Asn Pro Asp
 145 150 155 160

Thr Gly Ala Asp Phe Gly Ala Ala Pro Asp Ile Asp His Leu Asn Pro
 165 170 175

Arg Val Gln Lys Glu Leu Val Glu Leu Leu Asn Trp Leu Arg Thr Asp
 180 185 190

Ile Gly Phe Asp Gly Trp Arg Phe Asp Phe Ala Lys Gly Tyr Ser Ala
 195 200 205

Asp Val Ala Lys Ile Tyr Val Asp Arg Ser Glu Ala Ser Phe Ala Val
 210 215 220

Ala Glu Ile Trp Thr Ser Leu Ala Tyr Gly Gly Asp Gly Lys Pro Asn
 225 230 235 240

Leu Asn Gln Asp Pro His Arg Gln Glu Leu Val Asn Trp Val Asn Lys
 245 250 255

Val Gly Gly Ser Gly Pro Gly Thr Thr Phe Asp Phe Thr Thr Lys Gly
 260 265 270

Ile Leu Asn Val Ala Val Glu Gly Glu Leu Trp Arg Leu Arg Gly Thr
 275 280 285

Asp Gly Lys Ala Pro Gly Met Ile Gly Trp Trp Pro Ala Lys Ala Val
 290 295 300

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Thr Phe Val Asp Asn His Asp Thr Gly Ser Thr Gln His Met Trp Pro
 305 310 315 320

Phe Pro Ser Asp Arg Val Met Gln Gly Tyr Ala Tyr Ile Leu Thr His
 325 330 335

Pro Gly Pro Pro Cys Ile Phe Tyr Asp His Phe Phe Asp Trp Gly Leu
 340 345 350

Lys Glu Glu Ile Asp Arg Leu Val Ser Ile Arg Thr Arg Gln Gly Ile
 355 360 365

His Ser Glu Ser Lys Leu Gln Ile Ile Glu Ala Asp Ala Asp Leu Tyr
 370 375 380

Leu Ala Glu Ile Asp Gly Lys Val Ile Val Lys Leu Gly Pro Arg Tyr
 385 390 395 400

Asp Val Gly His Leu Ile Pro Gly Gly Leu Lys Val Ala Ala His Gly
 405 410 415

Lys Asp Tyr Ala Ile Trp Glu Lys Ile
 420 425

SEQ ID NO: 5

Length: 10

Type: PRT

Organism: Triticum aestivum

Sequence: 5

Lys Val Gly Gly Ser Gly Pro Gly Thr Thr
 1 5 10

3

T00220"9280E860

~~SEQUENCE LISTING~~

Does Not Comply
Corrected Diskette Needed

<1107 Applicant: Quality Wheat CRC Limited
 <1207 Title of the Invention: Detection of preharvest sprouting in cereal grains
 <1407 US 09/830,876
 <1417 2001-05-02
 <1607 ~~Number of SEQ ID Nos:~~ 5
 <1707 ~~Software:~~ PatentIn Ver. 2.1
 <2107 ~~SEQ ID NO:~~ 1
 <2117 ~~Length:~~ 15
 <2127 ~~Type:~~ PRT
 <2137 ~~Organism:~~ Triticum aestivum

see
pp 1-3

<4007 Sequence: 1
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 1 5 10 15

<2107 ~~SEQ ID NO:~~ 2
 <2117 ~~Length:~~ 10
 <2127 ~~Type:~~ PRT
 <2137 ~~Organism:~~ Triticum aestivum

<4007 Sequence: 2
 Cys Arg Asp Asp Arg Pro Tyr Ala Asp Gly
 1 5 10

SEQ ID NO: 3
 Length: 10
 Type: PRT
 Organism: Triticum aestivum

Sequence: 3
 Val Asn Trp Val Asn Lys Val Gly Gly Ser
 1 5 10

Please follow above
example in subsequent
sequences

SEQ ID NO: 4
 Length: 425
 Type: PRT
 Organism: Triticum aestivum

Sequence: 4
 Met Ala Ser Lys His Leu Ser Leu Phe Leu Val Leu Leu Gly Leu Ser
 1 5 10 15
 Ala Ser Leu Ala Ser Gly Gln Val Leu Phe Gln Gly Phe Asn Trp Glu
 20 25 30
 Ser Trp Lys His Asn Gly Gly Trp Tyr Asn Phe Leu Met Gly Lys Val

35					40					45					
Asp	Asp	Ile	Ala	Ala	Ala	Gly	Val	Thr	His	Val	Trp	Leu	Pro	Pro	Ala
50						55					60				
Ser	Gln	Ser	Val	Ser	Glu	Gln	Gly	Tyr	Met	Pro	Gly	Arg	Leu	Tyr	Asp
65					70					75					80
Leu	Asp	Ala	Ser	Lys	Tyr	Gly	Asn	Lys	Ala	Gln	Leu	Lys	Ser	Leu	Ile
				85					90					95	
Gly	Ala	Leu	His	Gly	Lys	Gly	Val	Lys	Ala	Ile	Ala	Asp	Ile	Val	Ile
			100					105					110		
Asn	His	Arg	Thr	Ala	Glu	Arg	Lys	Asp	Gly	Arg	Gly	Ile	Tyr	Cys	Ile
		115					120					125			
Phe	Glu	Gly	Gly	Thr	Pro	Asp	Ala	Arg	Leu	Asp	Trp	Gly	Pro	His	Met
	130					135					140				
Ile	Cys	Arg	Asp	Asp	Arg	Pro	Tyr	Ala	Asp	Gly	Thr	Gly	Asn	Pro	Asp
145					150					155					160
Thr	Gly	Ala	Asp	Phe	Gly	Ala	Ala	Pro	Asp	Ile	Asp	His	Leu	Asn	Pro
				165					170					175	
Arg	Val	Gln	Lys	Glu	Leu	Val	Glu	Leu	Leu	Asn	Trp	Leu	Arg	Thr	Asp
			180					185					190		
Ile	Gly	Phe	Asp	Gly	Trp	Arg	Phe	Asp	Phe	Ala	Lys	Gly	Tyr	Ser	Ala
	195						200					205			
Asp	Val	Ala	Lys	Ile	Tyr	Val	Asp	Arg	Ser	Glu	Ala	Ser	Phe	Ala	Val
	210					215					220				
Ala	Glu	Ile	Trp	Thr	Ser	Leu	Ala	Tyr	Gly	Gly	Asp	Gly	Lys	Pro	Asn
225					230					235					240
Leu	Asn	Gln	Asp	Pro	His	Arg	Gln	Glu	Leu	Val	Asn	Trp	Val	Asn	Lys
				245					250					255	
Val	Gly	Gly	Ser	Gly	Pro	Gly	Thr	Thr	Phe	Asp	Phe	Thr	Thr	Lys	Gly
			260					265					270		
Ile	Leu	Asn	Val	Ala	Val	Glu	Gly	Glu	Leu	Trp	Arg	Leu	Arg	Gly	Thr
	275						280					285			
Asp	Gly	Lys	Ala	Pro	Gly	Met	Ile	Gly	Trp	Trp	Pro	Ala	Lys	Ala	Val
	290					295					300				
Thr	Phe	Val	Asp	Asn	His	Asp	Thr	Gly	Ser	Thr	Gln	His	Met	Trp	Pro
305					310					315					320
Phe	Pro	Ser	Asp	Arg	Val	Met	Gln	Gly	Tyr	Ala	Tyr	Ile	Leu	Thr	His
				325					330				335		
Pro	Gly	Pro	Pro	Cys	Ile	Phe	Tyr	Asp	His	Phe	Phe	Asp	Trp	Gly	Leu

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340 345 350
Lys Glu Glu Ile Asp Arg Leu Val Ser Ile Arg Thr Arg Gln Gly Ile
355 360 365
His Ser Glu Ser Lys Leu Gln Ile Ile Glu Ala Asp Ala Asp Leu Tyr
370 375 380
Leu Ala Glu Ile Asp Gly Lys Val Ile Val Lys Leu Gly Pro Arg Tyr
385 390 395 400
Asp Val Gly His Leu Ile Pro Gly Gly Leu Lys Val Ala Ala His Gly
405 410 415
Lys Asp Tyr Ala Ile Trp Glu Lys Ile
420 425

SEQ ID NO: 5
Length: 10
Type: PRT
Organism: Triticum aestivum

Sequence: 5
Lys Val Gly Gly Ser Gly Pro Gly Thr Thr
1 5 10

3 delete

FYI Please review the
Sequence Listing to ensure that a corresponding explanation is presented in the <220> to
<223> fields of each sequence which presents at least one n or Xaa.

Please consult sample Sequence Listing
(attached)

for valid format

<110> Smith, John; Smithgene Inc.

<120> Example of a Sequence Listing

<130> 01-00001

<140> PCT/EP98/00001
<141> 1998-12-31

<150> US 08/999,999
<151> 1997-10-15

<160> 4

<170> PatentIn version 2.0

<210> 1
<211> 389
<212> DNA
<213> Paramecium sp.

<220>
<221> CDS
<222> (279)...(389)

<300>
<301> Doe, Richard
<302> Isolation and Characterization of a Gene Encoding a
Protease from Paramecium sp.
<303> Journal of Genes
<304> 1
<305> 4
<306> 1-7
<307> 1988-06-31
<308> 123456
<309> 1988-06-31

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tgatgtggca	attgctggca	gtgccacagg	cttttcagcc	aggcttaggg	tgggttcctc		180
cgcggcgcg	cggccctct	cgcgtctct	tgcgcctct	ctctcgtct	cctctcgtc		240

Appendix 3, page 2

ggacctgatt	aggtgagcag	gaggaggggg	cagtttagc	atg Met 1	ggt Val	tca Ser	atg Met	ttc Phe 5	agc Ser	296						
ttg Leu	tct Ser	ttc Phe	aaa Lys 10	tgg Trp	cct Pro	gga Gly	ttt Phe	tgt Cys 15	ttg Leu	ttt Phe	ggt Val	tgt Cys	ttg Leu 20	ttc Phe	caa Gln	344
tgt Cys	ccc Pro	aaa Lys 25	gtc Val	ctc Leu	ccc Pro	tgt Cys	cac His 30	tca Ser	tca Ser	ctg Leu	cag Gln	ccg Pro 35	aat Asn	ctt Leu	:	389

<210> 2
<211> 37
<212> PRT
<213> Paramecium sp.

<400> 2
Met Val Ser Met Phe Ser Leu Ser Phe Lys Trp Pro Gly Phe Cys Leu
1 10 15

Phe Val Cys Leu Phe Gln Cys Pro Lys Val Leu Pro Cys His Ser Ser
20 25 30

Leu Gln Pro Asn Leu
35

<210> 3
<211> 11
<212> PRT
<213> Artificial Sequence

<220>
<223> Designed peptide based on size and polarity to act as a linker between the alpha and beta chains of Protein XYZ.

<400> 3
Met Val Asn Leu Glu Pro Met His Thr Glu Ile
1 5 10

<210> 4
<400> 4
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[Annex VIII follows]

identifiers and their accompanying information as shown in the following table. The numeric identifier shall be used only in the "Sequence Listing." The order and presentation of the items of information in the "Sequence Listing" shall conform to the arrangement given below. Each item of information shall begin on a new line and shall begin with the numeric identifier enclosed in angle brackets as shown. The submission of those items of information designated with an "M" is mandatory. The submission of those items of information designated with an "O" is optional. Numeric identifiers <110> through <170> shall only be set forth at the beginning of the "Sequence Listing." The following table illustrates the numeric identifiers.

Numeric Identifier	Definition	Comments and Format	Mandatory (M) or Optional (O)
<110>	Applicant	Preferably max. of 10 names; one name per line; preferable format: Surname, Other Names and/or Initials	M
<120>	Title of Invention		M
<130>	File Reference	Personal file reference	M when filed prior to assignment of appl. number
<140>	Current Application Number	Specify as: US 07/999,999 or PCT/US96/99999	M, if available
<141>	Current Filing Date	Specify as: yyyy-mm-dd	M, if available
<150>	Prior Application Number	Specify as: US 07/999,999 or PCT/US96/99999	M, if applicable include priority documents under 35 USC 119 and 120
<151>	Prior Application Filing Date	Specify as: yyyy-mm-dd	M, if applicable
<160>	Number of SEQ ID NOs	Count includes total number of SEQ ID NOs	M
<170>	Software	Name of software used to create the Sequence Listing	O
<210>	SEQ ID NO:##	Response shall be an integer representing the SEQ ID NO shown	M
<211>	Length	Respond with an integer expressing the number of bases or amino acid residues	M

<212>	Type	Whether presented sequence molecule is DNA, RNA, or PRT (protein). If a nucleotide sequence contains both DNA and RNA fragments, the type shall be "DNA." In addition, the combined DNA/RNA molecule shall be further described in the <220> to <223> feature section.	M
<213>	Organism	Scientific name, i.e. Genus/species, Unknown or Artificial Sequence. In addition, the "Unknown" or "Artificial Sequence" organisms shall be further described in the <220> to <223> feature section.	M
<220>	Feature	Leave blank after <220>. <221-223> provide for a description of points of biological significance in the sequence.	M, under the following conditions: if "n," "Xaa," or a modified or unusual L-amino acid or modified base was used in a sequence; if ORGANISM is "Artificial Sequence" or "Unknown"; if molecule is combined DNA/RNA.
<221>	Name/Key	Provide appropriate identifier for feature, preferably from WIPO Standard ST.25 (1998), Appendix 2, Tables 5 and 6	M, under the following conditions: if "n," "Xaa," or a modified or unusual L-amino acid or modified base was used in a sequence
<222>	Location	Specify location within sequence; where appropriate state number of first and last bases/amino acids	M, under the following conditions: if "n," "Xaa," or a modified or unusual L-amino acid or modified

		in feature	base was used in a sequence
<223>	Other Information	Other relevant information; four lines maximum	M, under the following conditions: if "n," "Xaa," or a modified or unusual L-amino acid or modified base was used in a sequence; if ORGANISM is "Artificial Sequence" or "Unknown"; if molecule is combined DNA/RNA.
<300>	Publication Information	Leave blank after <300>	0
<301>	Authors	Preferably max of ten named authors of publication; specify one name per line; preferable format: Surname, Other Names and/or Initials	0
<302>	Title		0
<303>	Journal		0
<304>	Volume		0
<305>	Issue		0
<306>	Pages		0
<307>	Date	Journal date on which data published; specify as yyyy-mm-dd, MMM-yyyy or Season-yyyy	0
<308>	Database Accession Number	Accession number assigned by database including database name	0
<309>	Database Entry Date	Date of entry in database; specify as yyyy-mm-dd or MMM-yyyy	0
<310>	Patent Document Number	Document number; for patent-type citations only. Specify as, for example, US 07/999,999	0